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(54) Title: **NEW METHOD TO MEASURE A T CELL RESPONSE AND ITS USES TO QUALIFY ANTIGEN-PRESENTING
CELLS**

(57) Abstract: A method to characterize a T-cell response of a final population of T-lymphocytes resulting from the co-incubation of an initial population of T lymphocytes with a composition of antigen-presenting cells (APCs), said method comprising the steps of a) simultaneous measuring on a single cell basis at least two parameters: (i) proliferation of T lymphocytes and (ii) presence of a T cell antigen receptor on the surface of T lymphocytes and/or presence of at least one biological molecule produced by T lymphocytes, and the attribution of a positive or a negative value to each of these parameters, and b) classification of the final T-lymphocytes population into 2ⁿ different subsets of T lymphocytes, n being the number of parameters, each subset being characterized by a positive or a negative value respectively to each parameter, and the determination of the proportion of T lymphocytes present in each subset with respect to the number of T lymphocytes in the final population, with said proportion being characteristic of the T-cell response. Use of the method for batch release assay and potency assay.

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